

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant : Christopher J. Dyl Art Unit : 2157
Serial No. : 10/632,410 Examiner : El Hadji M Sall
Filed : August 1, 2003 Conf. No. : 4381
Title : EFFICIENT METHOD FOR PROVIDING GAME CONTENT TO A
 CLIENT

Mail Stop Appeal Brief - Patents

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

BRIEF ON APPEAL

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(1) Real Party in Interest

The real party in interest is Turbine, Inc., a corporation of Delaware having a place of business at 60 Glacier Drive, Suite 4000, Westwood, Massachusetts, as evidenced by an assignment executed February 8, 2005 and recorded at the U.S. Patent Office on May 3, 2006 at Reel 017577, Frame 0503.

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(2) Related Appeals and Interferences

There are no related appeals or interference.

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(3) Status of Claims

Claims 1-20 are pending and on appeal. Of these, claims 1, 8, and 15 are independent.

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(4) Status of Amendment

All amendments have been entered.

(5) Summary of Claimed Subject Matter

All citations herein are made with reference to the specification of this application, filed August 1, 2003.

CLAIM 1

Claim 1 recites a method for efficiently transmitting, to a client, a content update. The method includes hosting, for transmission, a content update having a plurality of data files; identifying a subset of the plurality of data files as high-quality data files; creating a high-quality content update that includes the identified high-quality data files; receiving a client connection request; determining that high-quality data files are to be transmitted to the client; transmitting the high-quality data files from the high-quality content update; and transmitting the remaining data files in the content update.

Claim 1's limitation of hosting, for transmission, a content update having a plurality of data files is described between page 8, line 21 and page 9, line 5.

Claim 1's limitation of identifying a subset of the plurality of data files as high-quality data files is described between page 9, line 6 and page 10, line 9, as well as FIGS. 3 and 4.

Claim 1's limitation of creating a high-quality content update that includes the identified high-quality data files is described on page 10, lines 10-14, in connection with the high-quality update package creation step **408**.

Claim 1's limitation of receiving a client connection request is described on page 10, lines 15-30 in connection with the connection request step **502**.

Claim 1's limitations of determining that high-quality data files are to be transmitted to the client and transmitting high-quality data files from the high-quality content update are described on page 10, lines 15-30 in connection with step **510**, the high-quality transmission step, and in FIG. 5.

Claim 1's limitation of transmitting remaining data files in the content update is described on page 10, lines 15-30 in connection with step **512**.

CLAIM 8

Claim 8 recites a method for efficiently transmitting a content update from a server to a client. The method includes the server hosting a content update having a plurality of data files; identifying a subset of the plurality of data files from the content update as high-quality data files; creating, by the server, a high-quality content update that includes the identified high-quality data files; the client requesting a connection with the server; determining, by the server, that high-quality data files should be transmitted to the client; the client receiving data files from the high-quality content update to the client; and the client receiving the remaining data files from the content update to the client.

Claim 8's limitation of the server hosting a content update having a plurality of data files is described between page 8, line 21 and page 9, line 5.

Claim 8's limitation of identifying a subset of the plurality of data files from the content update as high-quality data files is described between page 9, line 6 and page 10, line 9, as well as FIGS. 3 and 4.

Claim 8's limitation of creating, by the server, a high-quality content update that includes the identified high-quality data files is described on page 10, lines 10-14, in connection with the high-quality update package creation step **408**.

Claim 8's limitation of the client requesting a connection with the server is described on page 10, lines 15-30 in connection with the connection request step **502**.

Claim 8's limitation of determining, by the server, that high-quality data files should be transmitted to the client and the client receiving data files from the high-quality content update are described on page 10, lines 15-30 in connection with step **510**, the high-quality transmission step, and in FIG. 5.

Claim 8's limitation of the client receiving remaining data files from the content update is described on page 10, lines 15-30 in connection with step **512**.

CLAIM 15

Claim 15 recites a computer based content updating apparatus that includes a non-volatile memory element storing a content update having a plurality of data files; a processor in electrical communication with the non-volatile memory element for identifying a subset of the data files in the content update as high-quality data files, separating the high-quality data files from the content update, and storing, in the non-volatile memory element, a high-quality content update that includes the separated high-quality data files; and a transceiver in electrical communication with the non-volatile memory element and the processor, the transceiver receiving a connection request from a remote client on a network. The processor determines that high-quality data files are to be transmitted to the client and the transceiver transmits data files from the high-quality content update and the remaining data files from the content update.

Claim 15's limitation of a non-volatile memory element storing a content update having a plurality of data files is described between page 8, line 21 and page 9, line 5.

Claim 15's limitation of a processor for identifying a subset of the plurality of data files as high-quality data files is described between page 9, line 6 and page 10, line 9, as well as FIGS. 3 and 4.

Claim 15's limitation of a transceiver receiving a connection request from a client is described on page 10, lines 15-30 in connection with the connection request step **502**, on page 10, lines 15-30 in connection with step **510**, the high-quality transmission step, and in FIG. 5, and on page 10, lines 15-30 in connection with step **512**.

CLAIM 16

Claim 16 recites the same subject matter as claim 15, but with the additional step of the processor using a data quality function to identify a subset of the plurality of data files as high-quality data files.

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Claim 16's additional limitation, in which "using a data quality function, the processor identifies a subset of the plurality of data files as high-quality data files" is described on page 9, lines 20-26, in the discussion of step **404**, and in FIG. 4.

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(6) Grounds of Rejection to be Reviewed on Appeal

1. Claims 1-20 stand rejected under 35 USC 102(e) based on *Hallford* et al., U.S. Patent No. 7,185,352.
2. Claims 1, 8, and 15 stand rejected under 35 USC 112 second paragraph.

(7) Argument

Section 112 Rejection of Claims 1, 8, and 15

Claim 1 stands rejected as being indefinite under section 112 second paragraph because of an alleged lack of antecedent basis for “the remaining data files in the content update.”

In rejecting the claim, the Examiner appears to be mechanically applying a rule in which the first occurrence of any noun-phrase in a claim must be preceded by an indefinite article.

In fact, no *per se* rule exists. A determination of whether or not a claim complies with section 112 cannot be made on such a rote application of a grammatical rule. The test is whether one of ordinary skill in the art would, after having read the specification, understand the metes and bounds of the claimed subject matter. For example, According to *Morton International*, “[w]hether a claim is invalid for indefiniteness requires a determination of whether those skilled in the art would understand what is claimed when the claim is read in light of the specification.”¹ “If the claims read in light of the specification reasonably apprise those skilled in the art of the scope of the invention, [section] 112 demands no more.”²

In the present case, one of ordinary skill in the art would have understood from step (a) of claim 1 that a “content update” is something that has “a plurality of data files.” He would then have understood from step (b) that some of these data files are “high-quality data files.” The use of the term “subset of the plurality of data files” in step (b) would have suggested to him that there exist two kinds of data files within the plurality of data files:

¹ *Morton International Inc. v. Cardinal Chemical Co.*, 5 F.3d 1464, 28 USPQ 2d 1190 (Fed. Cir. 1993) on remand from 508 US 83, 26 USPQ 2d 1721 (1993).

² *Credle v. Bond*, 25 F.3d 1566, 30 USPQ 1911 (Fed. Cir. 1994).

- (1) "high-quality" data files; and
- (2) all other data files.

Given that there are only two kinds of data files in the content update, it is not too much to expect that one of ordinary skill in the art would have the common sense to understand "remaining data files" to mean all data files in the content update that are not "high quality" data files.

The Examiner's rote requirement of an indefinite article makes no sense in the context of "remaining data files." By definition, if one divides a set of data files into two subsets and names one of the two subsets, the remaining subset is completely defined. Accordingly, one of ordinary skill in the art would have readily understood the metes and bounds of the claimed invention.

Section 102 Rejection of Claim 1

*Hallford*³ discloses a system for transmitting television programming over a computer network. The *Hallford* system permits viewers to, among other things, rate particular television programs. These ratings are stored in content rating tables. FIG. 22 below is an exemplary content rating table.

800

NAME	RATING	RATING TYPE	IN CACHE	NEXT TREATMENT
ACTION DUDE	1	EXPLICIT	YES	REPLACE
THE FUNNY SHOW	0	EXPLICIT	YES	REPLACE
BLAST 'EM	0.5	IMPLICIT	YES	KEEP
HARDY HAR HAR	0.5	IMPLICIT	NO	CAPTURE

FIG. 22

The Examiner appears to regard "high-quality data files" as being associated with television programming that has been highly rated by viewers. The Examiner's position is therefore that if enough viewers like a particular program, the program must be a

³ *Hallford*, U.S. Patent No. 7,185,352, filed May 11, 2001.

“high-quality” program, in which case any data files that represent that program must be “high-quality data files.” Thus, with reference to FIG. 22 above, the Examiner’s would regard the data files for “Action Dude” as “high-quality” data files, and the data files associated with “The Funny Show” as not “high-quality” data files.

Appellant recognizes that the Examiner is entitled to apply the broadest reasonable interpretation when construing a claim. But that interpretation must also be consistent with what one of ordinary skill in the art who has read the specification would understand the claim to cover.

As a threshold matter, it is not actually the individual words in the claim that merit the broadest reasonable interpretation, but the claim as a whole. For example, according to *Phillips v. AWH*, 415 F.3d 1303, 75 USPQ2d 1321 (Fed. Cir. 2005). “[t]he Patent and Trademark Office (“PTO”) determines the scope of claims in patent applications not solely on the basis of the claim language, but upon giving claims their broadest reasonable construction “in light of the specification as it would be interpreted by one of ordinary skill in the art.” *In re Am. Acad. of Sci. Tech. Ctr.*, 367 F.3d 1359, 1364 (Fed.Cir.2004).

It is significant the Court in *Phillips* referred to “giving *claims* their broadest reasonable construction” and not to giving the individual words in the claim their broadest reasonable construction. Thus, the Court has recognized the folly of simply looking up each word in a claim in the dictionary, substituting the broadest reasonable interpretation of the individual words, and expecting that the resulting claim interpretation would make any sense.

Also, the broadest reasonable interpretation has to be tempered so that it is consistent with the interpretation that those skilled in the art would reach, *In re Cortright*, 165 F.3d 1353, 1359; 49 USPQ 2d 1464, 1468 (Fed. Cir. 1999).

In interpreting “high-quality” to refer to the viewers’ subjective impression of how entertaining the content is, the Examiner ignores Appellant’s specification.

According to Appellant's specification, "high-quality" content refers to content that has "graphics or audio files which are relatively large" and that "require more time and bandwidth to transmit." It is clear therefore that the term "high-quality data files" as used in claim 1 has nothing at all to do with the viewers' subjective preference for that file.

There is no indication in *Hallford* that a viewer's preference for a particular television program is based on anything but the entertainment value of the program. One cannot infer from *Hallford* that the data files for storing a program become smaller or larger in response to viewers' ratings.

For example, there is no suggestion that television programs with higher ratings, such as "Action Dude" in FIG. 22, would require "more time and bandwidth to transmit" than television programming with lower ratings, such as "The Funny Show."

Accordingly, there is no reasonable basis for the Examiner's suggestion that highly-rated television programs correspond to "high-quality data files" in claim 1.

Hallford neither teaches nor suggests a distinction between high-quality data files and all other data files. Hence, it cannot possibly disclose claim 1's step of "identifying a subset of the plurality of data files as high-quality data file." Since there is no identified high-quality subset of data files, the cited art cannot possibly disclose "creating a high-quality content update that includes the identified high-quality data files."

In view of the foregoing deficiencies, Appellant requests reversal of the section 102 rejection of claim 1. Claims 8 and 15 include limitations similar to claim 1. Accordingly, Appellant requests reversal of the section 102 rejection of those claims for similar reasons.

Section 102 Rejection of Claims 4 and 11

Claim 4 recites the further limitation that a certain fixed percentage of the highest quality data components be separated as high-quality data files..

The Examiner states that this limitation is disclosed in *Hallford* at col. 9, lines 5-13. This passage reads as follows:

“Consequently, content selected by the service provider broadcast system **300**, for example, in response to client rankings, is transmitted to one or more client systems using bandwidth provided by the broadcast service system **100**. However, in order to best utilize bandwidth provided by the broadcast service system **100**, the service provider broadcast system **300** generates a composite broadcast schedule or a composite content meta-data set in order to receive rankings for the service provider content data files, as well as the broadcast service content data files **101**.”

The cited text appears to say nothing more than that viewer rankings affect which television programs are transmitted to clients, and that one can more efficiently use bandwidth by using a “composite broadcast schedule” and a “composite content meta-data set.” Neither of these teachings amounts to teaching that “a certain fixed percentage” of television programs are somehow “separated as high-quality” television programs.

Since the cited text fails to teach the additional limitation of claim 4, and since nothing else in *Hallford* teaches that limitation, Appellant requests reversal of the section 102 rejection of claim 4.

Claim 11 includes limitations similar to claim 4. Accordingly, Appellant requests reversal of the section 102 rejection of claim 11 for similar reasons.

Section 102 Rejection of Claims 5 and 12

Claim 5 recites the further limitation that the data quality function yield “a data quality that is “a function of the sizes of the plurality of data files.”

The Examiner states that *Hallford* discloses the foregoing limitation within the following paragraph:

The broadcast server **103** is configured to broadcast a plurality of broadcast service content data files **101**, which may be received by clients **155**, **157** and **159**. In addition, the broadcast server **103** allocates bandwidth to the service provider server **153** in order to broadcast a plurality of provider content data files **151**, which are also received by clients **155**, **157** and **159**. The content data files **101/151** may include, for example, any combination of a number of different types of files including for example video, audio, graphics, text, multi-media or the like. For purposes of explanation, many of the examples provided in

this disclosure assume that the content data files to be broadcast by the server are audio/video files, such as for example movies with moving images and sound. However, it will be appreciated that the content data files broadcast in accordance with the teachings of the present invention are not limited only to audio/video files.⁴

The foregoing text states that data files can be of different types. The Examiner concludes that these different types would have different sizes. The Examiner then takes an inferential leap, suggesting that because different file types can have different sizes, it follows that there is a data quality function that is a function of the sizes of these data files.

Appellant does not claim the existence of files having different sizes. Claim 5 requires at least some connection between the data quality function and sizes of files. The Examiner has not shown where any such connection exists. Instead, he suggests that since sizes of different files can be different, there must be a data quality function in the cited reference that depends on file size.

The Examiner has already stated that he regards "quality" as being related to how highly viewers rank certain television programs. But such viewers would simply have been watching a television show. They would have had no way of knowing how large the data files bringing that show to them might have been. One of ordinary skill in the art would not have recognized how a viewer would know anything about the actual sizes of the data files that represent television programming. Therefore, it is unclear how there could be any relationship between sizes of files and the quality of those files.

Moreover, according to the Examiner's remarks concerning claim 3, the "data quality function" in the claim corresponds to the "key" discussed at *Hallford*, col. 8, lines 43-50. There is no indication of any relationship between this "key" and different sizes of data files.

⁴ *Hallford*, col. 5, lines 7-23.

All the Examiner has stated is that there exist different file types and that these file types have different sizes. This does not amount to teaching that a data quality function is “a function of the sizes of” the data files.

In view of the foregoing deficiency in the Examiner’s rejection, Appellant requests reversal of the section 102 rejection of claims 5 and 12.

Section 102 Rejection of Claims 6, 13, and 17

The Examiner states that the additional limitation of “removing the high-quality data files from the content update” is inherently disclosed at col. 7, lines 52-55. This cited text reads as follows:

The selected portion of the service provider content forms the content provider content data files **151** that the system **300** broadcasts to the clients **305, 307** and **309** via the broadcast server **103**.

The foregoing text does not disclose “removing high quality data files from the content update.”

One of ordinary skill in the art would have learned from the above text that there exists something called “service provider content,” and that some of this “service provider content” ultimately becomes “content provider content data files.” To the extent the “content provider content data files” are regarded as claim 6’s “content update,” one of ordinary skill in the art would have concluded from the foregoing passage that data files are *added to*, not *removed from* the “content provider content data files.”

The Examiner further states that “[i]nherently when performing the broadcast, the data files is [sic] removed from the service provider server.”⁵

This is not what the claim requires. The claim recites removing data files “from the content update.” The “content update” is not the same thing as the “service provider server.”

⁵ Office Action of 11/18/2008, page 6.

In view of the foregoing deficiencies, Appellant requests reversal of the section 102 rejection of claims 6, 13, and 17.

Section 102 Rejection of Claims 7, 14, and 18

Claim 7 requires the additional limitation of including “a bit value indicating high-quality files should be transferred.”

The Examiner asserts that a bit value indicating high quality data files should be transferred is disclosed by the following text from *Hallford*:

At process block **621**, it is determined whether content data files from the overlapping data files are available. At process block **623**, it is determined whether a content data file, available from the overlapping data files, is desired by the client system based on the content rating table (FIG. 11).

The cited text suggests that a content rating table, such as that shown in FIG. 22 above, is used in connection with determining whether a particular client wants a particular data file. Presumably, if the content rating table is stored on a computer, then a sequence of bits would cooperate to represent the content rating table of FIG. 22. But there is no indication from the cited text, or anywhere else in *Hallford*, that a single one of these bits is used by itself for “indicating high quality files should be transferred” or transmitted to the client.

Section 102 rejection of claim 20

Claim 20 recites the further limitation that the non-volatile memory element be associated with a first computer, the processor be associated with a second computer, the transceiver be associated with a third computer, and that the first computer, second computer, and third computer are in electrical connection with each other over a network.

The Examiner asserts that this claim limitation is disclosed in *Hallford* at FIG. 3. Specifically, the Examiner asserts that: (1) processor 203 and display controller 209 collectively form a processor associated with a first computer, (2) memory 205 and storage 211 collectively form a memory element associated with a second computer; and

(3) I/O controller 215 and I/O device 217 collectively form a transceiver associated with a third computer.

One of ordinary skill in the art would have read column 6, lines 9-10, which identify FIG. 3 as showing a single machine 201 that includes, within it the various components identified by the Examiner. From this, he would have reasonably inferred that those components are associated with the single machine shown, and not with three different computers as recited in the claim.

One of ordinary skill in the art would also have known that a bus is typically used for communication between components within a single machine. After noting that FIG. 3 discloses the above-mentioned components as communicating via a bus, he would have reasonably inferred that those components are associated with a single machine 201, and not with three different computers are recited in the claim.

The sole passage cited by the Examiner as showing the limitation of claim 20 clearly fails to do so. Accordingly, the section 102 rejection of claim 20 is improper and should be reversed.

(8) Appendix of Claims

1. A method for efficiently transmitting, to a client, a content update, the method comprising the steps of:
 - a) hosting, for transmission, a content update having a plurality of data files;
 - b) identifying a subset of the plurality of data files as high-quality data files;
 - c) creating a high-quality content update that includes the identified high-quality data files;
 - d) receiving a client connection request;
 - e) determining that high-quality data files are to be transmitted to the client;
 - f) transmitting the high-quality data files from the high-quality content update; and
 - g) transmitting the remaining data files in the content update.
2. The method of claim 1, wherein step a) comprises storing, on a network storage device, a content update having a plurality of data files.
3. The method of claim 1, wherein step b) comprises using a data quality function to identify a subset of the plurality of data files contained in the content update as high-quality data files.
4. The method of claim 3, wherein the plurality of data files contained in the content update are sorted by data quality, and wherein a certain fixed percentage of the highest quality data components are separated as high-quality data files.

5. The method of claim **3**, wherein the data quality function yields a data quality that is a function of the sizes of the plurality of data files.
6. The method of claim **1**, further comprising the step of removing the high-quality data files from the content update.
7. The method of claim **1**, wherein step e) comprises determining that the received request includes a bit value indicating high-quality files should be transferred.
8. A method for efficiently transmitting a content update from a server to a client, the method comprising:
 - a) the server hosting a content update having a plurality of data files;
 - b) identifying a subset of the plurality of data files from the content update as high-quality data files;
 - c) creating, by the server, a high-quality content update that includes the identified high-quality data files;
 - d) the client requesting a connection with the server;
 - e) determining, by the server, that high-quality data files should be transmitted to the client;
 - f) the client receiving data files from the high-quality content update to the client; and
 - g) the client receiving the remaining data files from the content update to the client.
9. The method of claim **8**, wherein step a) comprises storing, on a network storage device, a content update comprising a plurality of data files.

10. The method of claim **8**, wherein step b) comprises identifying a subset of the plurality of data files as high-quality data files using a data quality function.
11. The method of claim **10**, wherein the plurality of data files contained in the content update are sorted by data quality, and a certain fixed percentage of the highest quality data components are separated as high-quality data files.
12. The method of claim **10**, wherein the data quality function yields a data quality that is a function of the sizes of the plurality of data files.
13. The method of claim **8**, further comprising the step of removing the high-quality data files from the content update.
14. The method of claim **8**, wherein step e) comprises determining that the received request includes a bit value indicating high-quality files should be transferred.
15. A computer based content updating apparatus comprising:
 - a non-volatile memory element storing a content update having a plurality of data files;
 - a processor in electrical communication with the non-volatile memory element for identifying a subset of the data files in the content update as high-quality data files, separating the high-quality data files from the content update, and storing, in the non-volatile memory element, a high-quality content update that includes the separated high-quality data files; and
 - a transceiver in electrical communication with the non-volatile memory element and the processor, the transceiver receiving a connection request from a remote client on a network;

wherein the processor determines that high-quality data files are to be transmitted to the client and the transceiver transmits data files from the high-quality content update and the remaining data files from the content update.

16. The apparatus of claim 15, wherein, using a data quality function, the processor identifies a subset of the plurality of data files as high-quality data files.
17. The apparatus of claim 15, wherein the processor removes the high-quality data files from the content update.
18. The apparatus of claim 15, wherein the connection request from a remote client received by the transceiver includes a bit value indicating high-quality files should be transferred.
19. The apparatus of claim 15, wherein the non-volatile memory element comprises a network storage device.
20. The apparatus of claim 15, wherein the non-volatile memory element is associated with a first computer, the processor is associated with a second computer, the transceiver is associated with a third computer, and the first computer, second computer, and third computer are in electrical connection with each other over a network.

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(9) Evidence Appendix

None.

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(10) Related Proceedings Appendix

None.

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(11) Conclusion

Appellant requests an extension of time under Rule 1.136. Please charge the appeal brief fee in the amount of \$270.00 and the four month extension of time fee in the amount of \$865.00 to our Deposit Account No. 50-4189, referencing Attorney Docket 30064-014001.

Respectfully submitted,

Date:August 18, 2009

/Faustino A. Lichauco/

Faustino A. Lichauco

Reg. No. 41,942

Customer No. 69713
Occhiuti Rohlicek & Tsao LLP
10 Fawcett Street
Cambridge, MA 02138
Telephone: (617) 500-2501
Facsimile: (617) 500-2499